

Turf Origins
Alexia Graham
P.O. BOX 390113
Deltona FL 32739

REPORT OF ANALYSIS

For: (70681) Turf Origins
 600mg Citrus Bitters
 Turf Origins

Analysis	Level Found			Reporting		Analyst-Date	Verified-Date
	As Received	Dry Weight	Units	Limit	Method		
Sample ID: T023-1	Lab Number: 14125254		Date Sampled: 2023-08-25				
Moisture (vacuum oven - 70°C)	1.44	//////	%	0.01	AOAC 969.35	bjp7-2023/09/01	cmw4-2023/09/05
Dry matter	98.56	//////	%	0.010	Calculation	Auto-2023/09/05	Auto-2023/09/05
Protein (crude)	0.31	0.31	%	0.05	AOAC 990.03	jmr5-2023/09/01	cmw4-2023/09/05
Fat (acid hydrolysis)	97.2	98.6	%	0.10	AOAC 954.02 (mod)	bvm9-2023/09/05	cmw4-2023/09/05
Fiber (crude)	< 0.20	< 0.20	%	0.20	AOCS Ba 6a-05	pjj6-2023/09/05	cmw4-2023/09/05
Ash	0.12	0.12	%	0.10	AOAC 942.05	Trh9-2023/09/05	cmw4-2023/09/05
Total digestible nutrients	195	198	%	0.1	Calculation	Auto-2023/09/05	Auto-2023/09/05
Net energy (lactation)	2.12	2.15	Mcal/lbs	0.01	Calculation	Auto-2023/09/05	Auto-2023/09/05
Net energy (maint.)	2.38	2.41	Mcal/lbs	0.01	Calculation	Auto-2023/09/05	Auto-2023/09/05
Net energy (gain)	1.49	1.51	Mcal/lbs	0.01	Calculation	Auto-2023/09/05	Auto-2023/09/05
Digestible energy	3.90	3.96	Mcal/lbs	0.01	Calculation	Auto-2023/09/05	Auto-2023/09/05
Metabolizable energy	3.74	3.80	Mcal/lbs	0.01	Calculation	Auto-2023/09/05	Auto-2023/09/05

The result(s) issued on this report only reflect the analysis of the sample(s) submitted.

Our reports and letters are for the exclusive and confidential use of our clients and may not be reproduced in whole or in part, nor may any reference be made to the work, the results, or the company in any advertising, news release, or other public announcements without obtaining our prior written authorization.

REPORT NUMBER

23-248-9099

REPORT DATE
Sep 05, 2023
RECEIVED DATE
Aug 31, 2023

SEND TO
70681



13611 B Street • Omaha, Nebraska 68144-3693 • (402) 334-7770
www.midwestlabs.com

PAGE 2/2

ISSUE DATE
Sep 05, 2023

Turf Origins
Alexia Graham
P.O. BOX 390113
Deltona FL 32739

REPORT OF ANALYSIS

For: (70681) Turf Origins
600mg Citrus Bitters
Turf Origins

Analysis	Level Found		Units	Reporting		Analyst-Date	Verified-Date
	As Received	Dry Weight		Limit	Method		

For questions please contact:

Jade Cameron
Account Manager
jcameron@midwestlabs.com (402)829-9856

The result(s) issued on this report only reflect the analysis of the sample(s) submitted.

Our reports and letters are for the exclusive and confidential use of our clients and may not be reproduced in whole or in part, nor may any reference be made to the work, the results, or the company in any advertising, news release, or other public announcements without obtaining our prior written authorization.

Turf Origins

P.O. Box 390113 Deltona, FL 32739



600mg Citrus Spice

Seed to Sale: N/A
Retail Batch#: N/A
Cultivar: N/A
Cultivation Facility: N/A
Processing Facility: N/A
Sampling: SOP 21

COMPLIANCE FOR RETAIL

Sample Name: 600mg Citrus Spice Batch # T023-1

Lab Sample ID: F303067-01
Retail Batch Total Wt/Vol: N/A
Retail Batch Date: N/A

Matrix: Non-Inhalable Product
Retail Batch Total Units: N/A
Total Wt, Vol or Unit Sampled: 1

Date Sampled: 03/16/2023
Date Received: 03/16/2023
Date Reported: 03/27/2023



Terpenes
Tested



Heavy Metals
Pass



Foreign Materials
Pass



Microbiology
Pass



Mycotoxins
Pass



Residual Solvents
Pass



Pesticides
Pass



Homogeneity
Not Tested



Water Activity
Not Tested



ND %
ND mg/g
ND mg/Unit
Total THC

2.29 %
22.9 mg/g
652.70 mg/Unit
Total CBD

Terpenes Profile

Date Prepared: 03/21/23 09:56 Prep ID: AJ Specimen Prep: 1.0293 g / 10 mL
Date Analyzed: 03/21/23 15:54 Analyzed ID: NS Instrument: GCMS
Lab Batch: B23C008 Prep/Analysis Method: ACCU LAB SOP17

Analyte	Dilution	LOQ	Results
		mg/g	mg/g
d-Limonene	10	3.9	5.6
gamma-Terpinene	1	0.39	1.2
alpha-Bisabolol	1	0.39	ND
alpha-Cedrene	1	0.39	ND
alpha-Humulene	1	0.39	ND
alpha-Pinene	1	0.39	ND
alpha-Terpinene	1	0.39	ND
beta-Caryophyllene	1	0.39	ND
beta-Myrcene	1	0.39	ND
beta-Pinene	1	0.39	ND
Borneol	1	0.39	ND
Camphene	1	0.39	ND
Camphor	1	0.39	ND
Caryophyllene Oxide	1	0.39	ND
Cedrol	1	0.39	ND
cis-Nerolidol	1	0.39	ND
Delta-3-carene	1	0.39	ND
Endo-fenchyl alcohol	1	0.39	ND
Eucalyptol	1	0.39	ND
Farnesene	1	0.39	ND
Fenchone	1	0.39	ND
Geraniol	1	0.39	ND
Geranyl acetate	1	0.39	ND
Guaiol	1	0.39	ND
Hexahydrothymol	1	0.39	ND
Isoborneol	1	0.39	ND
Isopulegol	1	0.39	ND
Linalool	1	0.39	ND
Nerol	1	0.39	ND
Ocimene	1	0.39	ND
p-Mentha-1,5-diene	1	0.39	ND
Pulegone	1	0.39	ND
Sabinene	1	0.39	ND
Sabinene hydrate	1	0.39	ND
Terpineol	1	0.39	ND
Terpinolene	1	0.39	ND
trans-Nerolidol	1	0.39	ND
Valencene	1	0.39	ND

Total Terpenes mg/g **6.80**

Cannabinoids (as Received)

Date Prepared: 03/21/23 13:11 Prep ID: JG Specimen Prep: 0.2724 g / 10 mL
Date Analyzed: 03/22/23 15:36 Analyst ID: MM Instrument: HPLC
Lab Batch: B23C025 Prep/Analysis Method: ACCU LAB SOP15

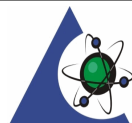
Analyte	Dilution	LOQ	Results	Results	mg/Serving
			%	mg/g	mg/unit
CBC	5	0.0734	ND	ND	ND
CBCA	5	0.0734	ND	ND	ND
CBD	50	0.734	2.21	22.1	629.90
CBDa	5	0.0734	0.0870	0.870	24.80
CBDV	5	0.0734	ND	ND	ND
CBDVA	5	0.0734	ND	ND	ND
CBG	5	0.0734	ND	ND	ND
CBGA	5	0.0734	ND	ND	ND
CBN	5	0.0734	ND	ND	ND
delta-8 THC	5	0.0734	ND	ND	ND
delta-9 THC	5	0.0734	ND	ND	ND
THCA	5	0.0734	ND	ND	ND
THCV	5	0.0734	ND	ND	ND
THCVA	5	0.0734	ND	ND	ND

Definitions and Abbreviations used in this report:

Total CBD = CBD + (CBD-A * 0.877), Total THC = THCA-A * 0.877 + Delta 9 THC

LOQ = Limit of Quantitation, LOD = Limit of Detection, DIL = Dilution Factor, (ppb) = Parts per Billion, (%) = Percent, (cfu/g) = Colony Forming Unit per Gram, (µg/g) = Microgram per Gram, (ppm) = Parts per Million, (N/A) Not Analyzed, (ND) Non-Detect. Total Contaminant Load (TCL) - The sum of all Heavy Metals and Agricultural Agents present above the LOQ, but below the Acceptable Limit.

This report shall not be reproduced except in its entirety without the written approval of AccuScience Laboratories. The results of this report relate only to the material or product analyzed. Test results are confidential unless explicitly waived otherwise. This laboratory is accredited in accordance with International Standard ISO/IEC 17025.



PJLA
Testing
Accreditation#: 109150

Dr. Harry Bezhadi, PhD.
President, CEO



Turf Origins

P.O. Box 390113 Deltona, FL 32739

600mg Citrus Spice

Seed to Sale: N/A
Retail Batch#: N/A
Cultivar: N/A
Cultivation Facility: N/A
Processing Facility: N/A
Sampling: SOP 21

COMPLIANCE FOR RETAIL

Sample Name: 600mg Citrus Spice Batch # T023-1

Lab Sample ID: F303067-01

Matrix: Non-Inhalable Product

Date Sampled: 03/16/2023

Retail Batch Total Wt/Vol: N/A

Retail Batch Total Units: N/A

Date Received: 03/16/2023

Retail Batch Date: N/A

Total Wt, Vol or Unit Sampled: 1

Date Reported: 03/27/2023

Pesticides

Date Prepared: 03/21/23 09:52
Date Analyzed: 03/21/23 16:14
Batch: B23C027

Prep ID: AJ
Analyst ID: AJ

Specimen Prep: 1.0293 g / 10 mL
Instrument: LC/MS/MS

Prep Method: LAB SOP 8 Analysis Method: ACCU LAB SOP18

Pass

Analyte	DIL	Action Limit	LOQ	Results	Status	Analyte	DIL	Action Limit	LOQ	Results	Status
		ppb	ppb	ppb				ppb	ppb	ppb	
Abamectin	10	300	4.9	ND	Pass	Imidacloprid	10	3000	4.9	ND	Pass
Acephate	10	3000	4.9	ND	Pass	Kresoxim methyl	10	1000	4.9	ND	Pass
Acequinocyl	10	2000	4.9	ND	Pass	Malathion	10	2000	4.9	ND	Pass
Acetamiprid	10	3000	4.9	ND	Pass	Metalaxyl	10	3000	4.9	ND	Pass
Aldicarb	10	100	4.9	ND	Pass	Methiocarb	10	100	4.9	ND	Pass
Azoxystrobin	10	3000	4.9	ND	Pass	Methomyl	10	100	4.9	ND	Pass
Bifenazate	10	3000	4.9	ND	Pass	Mevinphos	10	100	4.9	ND	Pass
Bifenthrin	10	500	4.9	ND	Pass	Myclobutanil	10	3000	4.9	ND	Pass
Boscalid	10	3000	4.9	ND	Pass	Naled	10	500	4.9	ND	Pass
Carbaryl	10	500	4.9	ND	Pass	Oxamyl	10	500	4.9	ND	Pass
Carbofuran	10	100	4.9	ND	Pass	Paclotrazol	10	100	4.9	ND	Pass
Chlorantraniliprole	10	3000	4.9	ND	Pass	Permethrin	10	1000	4.9	ND	Pass
Chlorfenapyr	10	100	4.9	ND	Pass	Phosmet	10	200	4.9	ND	Pass
Chlormequat	10	3000	4.9	ND	Pass	Piperonyl butoxide	10	3000	4.9	ND	Pass
Chlorpyrifos	10	100	4.9	ND	Pass	Prallethrin	10	400	4.9	ND	Pass
Clofentezine	10	500	4.9	ND	Pass	Propiconazole	10	1000	4.9	ND	Pass
Coumaphos	10	100	4.9	ND	Pass	Propoxur	10	100	4.9	ND	Pass
Cyfluthrin	10	1000	4.9	ND	Pass	Pyrethrins	10	1000	4.9	ND	Pass
Cypermethrin	10	1000	4.9	ND	Pass	Pyridaben	10	3000	4.9	ND	Pass
Daminozide	10	100	4.9	ND	Pass	Spinetoram J	10	3000	4.9	ND	Pass
Diazinon	10	200	4.9	ND	Pass	Spinetoram L	10	3000	4.9	ND	Pass
Dichlorvos	10	100	4.9	ND	Pass	Spinosyn A	10	3000	4.9	ND	Pass
Dimethoate	10	100	4.9	ND	Pass	Spinosyn D	10	3000	4.9	ND	Pass
Dimethomorph	10	3000	4.9	ND	Pass	Spiromesifen	10	3000	4.9	ND	Pass
Ethoprophos	10	100	4.9	ND	Pass	Spirotetramat	10	3000	4.9	ND	Pass
Etofenprox	10	100	4.9	ND	Pass	Spiroxamine	10	100	4.9	ND	Pass
Etoazole	10	1500	4.9	ND	Pass	Tebuconazole	10	1000	4.9	ND	Pass
Fenhexamid	10	3000	4.9	ND	Pass	Thiacloprid	10	100	4.9	ND	Pass
Fenoxycarb	10	100	4.9	ND	Pass	Thiamethoxam	10	1000	4.9	ND	Pass
Fenpyroximate	10	2000	4.9	ND	Pass	Trifloxystrobin	10	3000	4.9	ND	Pass
Fipronil	10	100	4.9	ND	Pass	Captan	1	3000	120	ND	Pass
Fonicamid	10	2000	4.9	ND	Pass	Chlordane	1	100	25	ND	Pass
Fludioxonil	10	3000	4.9	ND	Pass	Methyl parathion	1	100	25	ND	Pass
Hexythiazox	10	2000	4.9	ND	Pass	Pentachloronitrobenzene	1	200	25	ND	Pass
Imazalil	10	100	4.9	ND	Pass						

Definitions and Abbreviations used in this report:

Total CBD = CBD + (CBD-A * 0.877), Total THC = THCA-A * 0.877 + Delta 9 THC

LOQ = Limit of Quantitation, LOD = Limit of Detection, DIL = Dilution Factor, (ppb) = Parts per Billion, (%) = Percent, (cfu/g) = Colony Forming Unit per Gram, (µg/g) = Microgram per Gram, (ppm) = Parts per Million, (N/A) Not Analyzed, (ND) Non-Detect. Total Contaminant Load (TCL) - The sum of all Heavy Metals and Agricultural Agents present above the LOQ, but below the Acceptable Limit.

This report shall not be reproduced except in its entirety without the written approval of AccuScience Laboratories. The results of this report relate only to the material or product analyzed. Test results are confidential unless explicitly waived otherwise. This laboratory is accredited in accordance with International Standard ISO/IEC 17025.



Accreditation#: 109150



Dr. Harry Bezhadi, PhD.
President, CEO



Turf Origins

P.O. Box 390113 Deltona, FL 32739

600mg Citrus Spice

Seed to Sale: N/A
Retail Batch#: N/A
Cultivar: N/A
Cultivation Facility: N/A
Processing Facility: N/A
Sampling: SOP 21

COMPLIANCE FOR RETAIL

Sample Name: 600mg Citrus Spice Batch # T023-1

Lab Sample ID: F303067-01 Matrix: Non-Inhalable Product
Retail Batch Total Wt/Vol: N/A Retail Batch Total Units: N/A
Retail Batch Date: N/A Total Wt, Vol or Unit Sampled: 1

Date Sampled: 03/16/2023
Date Received: 03/16/2023
Date Reported: 03/27/2023

Microbials

Pass

Date Prepared: 03/21/23 12:00 Prep ID: LM Specimen Prep: 1 g / 1 g
Date Analyzed: 03/23/23 15:41 Analyst ID: PC Instrument: PCR
Lab Batch: B23C007 Analysis Method: ACCU LAB SOP14

Analyte	Action Limit	LOQ	Results	Status
	cfu/g	cfu/g	cfu/g	
Aspergillus Flavus	1	1.00	<1.00	Pass
Aspergillus Fumigatus	1	1.00	<1.00	Pass
Aspergillus Niger	1	1.00	<1.00	Pass
Aspergillus Terreus	1	1.00	<1.00	Pass
E. coli specific gene	1	1.00	<1.00	Pass
E. coli/shigella spp.	1	1.00	<1.00	Pass
Salmonella specific gene	1	1.00	<1.00	Pass
Stx1 gene	1	1.00	<1.00	Pass
Stx2 gene	1	1.00	<1.00	Pass
Yeast and Mold	100000	10000	<10000	Pass

Mycotoxins

Pass

Date Prepared: 03/21/23 09:52 Extracted By: AJ Specimen Prep: 1.0293 g / 10 mL
Date Analyzed: 03/21/23 16:14 Analyzed By: AJ Instrument: LCMSMS
Lab Batch: B23C027 Analysis Method: ACCU LAB SOP18

Analyte	DIL	Action Limit	LOQ	Results	Status
		ppb	ppb	ppb	
afatoxin B1	10	20	0.97	ND	Pass
afatoxin B2	10	20	0.97	ND	Pass
afatoxin G1	10	20	0.97	ND	Pass
afatoxin G2	10	20	0.97	ND	Pass
ochratoxin A	10	20	0.97	ND	Pass

Heavy Metals

Pass

Date Prepared: 03/21/23 11:50 Extracted By: AJ Specimen Prep: 1.05 g / 50 mL
Date Analyzed: 03/23/23 12:34 Analyzed By: JG Instrument: ICPMS
Lab Batch: B23B049 Analysis Method: ACCU LAB SOP19

Analyte	DIL	Action Limit	LOQ	Results	Status
		ppb	ppb	ppb	
Arsenic	1	1500	95	ND	Pass
Cadmium	1	500	95	ND	Pass
Lead	1	500	95	ND	Pass
Mercury	1	3000	95	ND	Pass

Foreign Materials

Pass

Date Prepared: 03/21/23 13:50 Prep ID: WM Specimen Prep: 1 g / 1 g
Date Analyzed: 03/21/23 14:12 Analyst ID: WM Instrument: Visual Inspection
Lab Batch: B23C028 Analysis Method: ACCU LAB SOP04

Analyte	Action Limit (% by wt)	Results	Status
Foreign Material	1%	Pass	Pass

Total Contaminant Load

	Action Limit	Results	Status
	ppb	ppb	
Total Contaminant Load - Overall Sum	30,000	ND	Pass
Total Contaminant Load - Heavy Metals	30,000	ND	Pass
Total Contaminant Load - Pesticides	30,000	ND	Pass

Definitions and Abbreviations used in this report:

Total CBD = CBD + (CBD-A * 0.877), Total THC = THCA-A * 0.877 + Delta 9 THC
LOQ = Limit of Quantitation, LOD = Limit of Detection, DIL = Dilution Factor, (ppb) = Parts per Billion, (%) = Percent, (cfu/g) = Colony Forming Unit per Gram, (µg/g) = Microgram per Gram, (ppm) = Parts per Million, (N/A) Not Analyzed, (ND) Non-Detect. Total Contaminant Load (TCL) - The sum of all Heavy Metals and Agricultural Agents present above the LOQ, but below the Acceptable Limit.

This report shall not be reproduced except in its entirety without the written approval of AccuScience Laboratories. The results of this report relate only to the material or product analyzed. Test results are confidential unless explicitly waived otherwise. This laboratory is accredited in accordance with International Standard ISO/IEC 17025.

Turf Origins

P.O. Box 390113 Deltona, FL 32739

600mg Citrus Spice

Seed to Sale: N/A
Retail Batch#: N/A
Cultivar: N/A
Cultivation Facility: N/A
Processing Facility: N/A
Sampling: SOP 21

COMPLIANCE FOR RETAIL

Sample Name: 600mg Citrus Spice Batch # T023-1

Lab Sample ID: F303067-01

Matrix: Non-Inhalable Product

Date Sampled: 03/16/2023

Retail Batch Total Wt/Vol: N/A

Retail Batch Total Units: N/A

Date Received: 03/16/2023

Retail Batch Date: N/A

Total Wt, Vol or Unit Sampled: 1

Date Reported: 03/27/2023

Residual Solvents

Pass

Date Prepared: 03/21/23 09:10
Date Analyzed: 03/21/23 14:55
Lab Batch: B23A035

Prep ID: SP
Analyst ID: SP

Specimen Prep: 0.1023 g / 1 mL
Instrument: Headspace GC-FID
Analysis Method: ACCU LAB SOP16

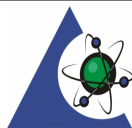
Analyte	DIL	Action Limit	LOQ	Results	Status
		ppm	ppm	ppm	
1,1-Dichloroethene	1	8	2.0	ND	Pass
1,2-Dichloroethane	1	2	2.0	ND	Pass
2-Propanol (IPA)	1	500	39	ND	Pass
Acetone	1	750	39	ND	Pass
Acetonitrile	1	60	39	ND	Pass
Benzene	1	1	0.98	ND	Pass
Butane	1	5000	39	ND	Pass
Chloroform	1	2	2.0	ND	Pass
Ethanol	1	5000	39	ND	Pass
Ethyl acetate	1	400	39	ND	Pass
Ethyl ether	1	500	39	ND	Pass
Ethylene oxide	1	5	3.9	ND	Pass
Methanol	1	250	39	ND	Pass
Methylene chloride	1	125	39	ND	Pass
n-Heptane	1	5000	39	ND	Pass
n-Hexane	1	250	39	ND	Pass
Pentane	1	750	39	ND	Pass
Propane	1	5000	39	ND	Pass
Toluene	1	150	39	ND	Pass
Total xylenes	1	150	39	ND	Pass
Trichloroethene	1	25	2.0	ND	Pass

Definitions and Abbreviations used in this report:

Total CBD = CBD + (CBD-A * 0.877), Total THC = THCA-A * 0.877 + Delta 9 THC

LOQ = Limit of Quantitation, LOD = Limit of Detection, DIL = Dilution Factor, (ppb) = Parts per Billion, (%) = Percent, (cfu/g) = Colony Forming Unit per Gram, (µg/g) = Microgram per Gram, (ppm) = Parts per Million, (N/A) Not Analyzed, (ND) Non-Detect. Total Contaminant Load (TCL) - The sum of all Heavy Metals and Agricultural Agents present above the LOQ, but below the Acceptable Limit.

This report shall not be reproduced except in its entirety without the written approval of AccuScience Laboratories. The results of this report relate only to the material or product analyzed. Test results are confidential unless explicitly waived otherwise. This laboratory is accredited in accordance with International Standard ISO/IEC 17025.



PJLA
Testing

Accreditation#: 109150



Dr. Harry Bezhadi, PhD.
President, CEO

